35

## CLAIMS

- 1. A device to be fitted on a vehicle wheel (1) of a predetermined size in order to increase the friction between the wheel and the road surface during winter conditions, comprising a belt (3) intended to encircle the tread (4) of the wheel (1) and be held in place by means of flexible inner and outer side portions (5,8) which, at least on the inner side of the wheel, is tightened by means of an elastic member (7), characterized in that the internal circumference of the belt (3) is at least 4% larger than the largest circumference of the wheel (1).
- 2. A device according to claim 1, characterized in that the internal circumference of the belt (3) is 4-10%, preferably 5-6% larger than the largest circumference of the wheel.
- A device according to one of the preceding claims,
   characterized in that the outer side portion (8) is designed so as to prevent it from jumping over the wheel (1) to the inside thereof.
- A device according to one of the preceding claims,
   characterized in that the outer side portion (8) is designed to cover substantially the outer side of the wheel (1) and that it preferably is made of a netting material preferably comprising a PVC coated 1100 dtex polyester multifilament material and having a netting opening of 2 7 mm,
   preferably about 4 mm.
  - 5. A device according to claim 3, characterized in that the outer side portion (8) has at least one opening, the largest circumference (10) of such an opening being less than 2.2 times the largest diameter of the wheel (1).

10

15

20

30

35

- 6. A device according to one of the preceding claims, characterized in that the outer side portion (8) is provided with radially extending straps (9).
- 7. A device according to one of the preceding claims, characterized in that the elastic member (7) comprises a rubber-elastic material which is covered by spinning about it, or is spun, woven or knitted together with, a substantially inelastic thread material, said thread material

limiting the extensibility of the elastic member (7).

- 8. A device according to one of the preceding claims, characterized in that the belt (3) consists mostly of a textile material, preferably a woven polyamide.
- 9. A device according to claim 8, characterized in that the belt (3) comprises two layers of textile material which, preferably on one side, is coated with a suitable plastic, e.g. polyurethane rubber, the two layers being arranged so that the plastic coatings contact one another.
- 10. A device according to any one of claims 1 7, characterized in that the belt (3) is of a multilayer
  25 construction, the outer surface comprising polyester multifilament yarn oriented crosswise to the circumferential direction of the belt (3), and preferably having a fineness of about 1100 dtex, the layer construction pattern preferably being 4-shed broken twill.
  - 11. A device according to claim 8, characterized in that the multilayer construction has an inner layer of a colour different from that of an outer layer and preferably being made of a polyester or polyamide multifilament material.
    - 12. A device according to claim 11,

PCT/NO00/00113

characterized in that the outer and inner layers are interconnected by a common yarn system in said circumferential direction, preferably comprising a polyester multifilament of about 1100 dtex.

5

10

- A device according to one of the preceding claims, characterized in that the inside of the inner side portion (5) is coated by a low friction coating, preferably a silicon polymer, butadiene rubber, neoprene rubber, PVC or similar polymer.
- A method for fitting a device (2) on a vehicle wheel (1), resting against a road surface, in order to increase the friction between the wheel and the road surface during 15 winter conditions, said device comprising a belt (3) intended to encircle the tread (4) of the wheel (1) and be held in place by means of flexible inner and outer side portions (5,8) which, at least on the inside of the wheel, is tensioned by means of an elastic member (7), characterized in that the inner side portion (5) is fitted
- 20 over the tread (4) of the wheel (1) to the inside of the wheel along at least two thirds of the circumference of the wheel, preferably along as much as possible of that part of the circumference which does not rest against the road 25 surface, whereupon the wheel (1) is rotated by means of the
  - vehicle, whereby the remaining part of the inner side portion (5) is moved to a position where it is permitted to assume its place on the inside of the wheel (1) and pull the belt (3) in place along the tread (4) of the wheel.